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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/833,456	04/12/2001	Jean-Michel Philippoz	AD 6802 US NA	3326
23906	7590	04/29/2004	EXAMINER	
E I DU PONT DE NEMOURS AND COMPANY LEGAL PATENT RECORDS CENTER BARLEY MILL PLAZA 25/1128 4417 LANCASTER PIKE WILMINGTON, DE 19805			BRUENIES, CHRISTOPHER P	
			ART UNIT	PAPER NUMBER
			1772	

DATE MAILED: 04/29/2004

Please find below and/or attached an Office communication concerning this application or proceeding.



AS

<b>Office Action Summary</b>	<b>Application No.</b> 09/833,456	<b>Applicant(s)</b> PHILIPPOZ ET AL.	
	<b>Examiner</b> Christopher P Bruenjes	<b>Art Unit</b> 1772	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 29 March 2004.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1 and 3-9 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1 and 3-9 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948)                                    | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |



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**DETAILED ACTION**

**WITHDRAWN REJECTIONS**

1. The 35 U.S.C. 102 rejections of claims 1, 3-6, and 9-10 as anticipated by Vercesi of record in the Office Action mailed May 15, 2003, Pages 3-4, have been withdrawn due to Applicant's amendments in the Paper filed March 29, 2004.

2. The 35 U.S.C. 103 rejection of claim 9 over Gotz in view of Vercesi of record in the Office Action mailed May 15, 2003, Pages 5-7, has been withdrawn due to Applicant's amendments in the Paper filed March 29, 2004.

**REPEATED REJECTIONS**

3. The 35 U.S.C. 103 rejections of claims 1 and 3-7 over Gotz in view of Vercesi are repeated for the reasons previously of record in the Office Action mailed May 15, 2003, Pages 5-7.

Regarding the newly added limitation to claim 1, the solidified article is hollow and prepared by blow molding, Gotz teaches a solidified hollow article (col.1, 1.29). Gotz further teaches that the hollow articles are prepared by blow molding (col.10, 1.10-13).



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4. The 35 U.S.C. 103 rejection of claim 8 over Gotz in view of Vercesi is repeated for the reasons previously of record in the Office Action mailed May 15, 2003, Pages 7-8.

**NEW REJECTIONS**

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
  2. Ascertaining the differences between the prior art and the claims at issue.
  3. Resolving the level of ordinary skill in the pertinent art.
  4. Considering objective evidence present in the application indicating obviousness or nonobviousness.
5. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Gotz et al (USPN 5,468,530) in view of Vercesi



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et al (USPN 5,830,395) as applied to claim 1 above, and further in view of Van Ert et al (USPN 6,221,291).

Gotz et al and Vercesi et al taken as a whole teach all that is claimed in claim 1, but fail to explicitly teach that the blow molded article is a co-extruded blow molded article. However, Van Ert et al teach that preforms formed from entirely virgin resin, such as the preforms of Gotz et al and Vercesi et al, are costly to manufacture (col.1, 1.10-15). Van Ert et al further teaches that in order to lower the cost of manufacturing preforms, such as the ones taught by Gotz et al and Vercesi et al, the preform is formed with a layer of waste plastic material bonded with the virgin resin. The waste plastic material layer and virgin resin layers are produced including reinforcing fibers (col.4, 1.16-35), because when blow molded articles are formed utilizing waste plastic material the layers are co-extruded to form a parison having a reinforcing layer to provide the necessary melt strength to the parison so that it can be blow molded (col.7, 1.63 through col.8, 1.8). One of ordinary skill in the art would have recognized that when forming blow molded articles incorporating reinforcing fibers, such as aramid fibers, the parison or preform is formed by co-extrusion of a virgin layer incorporating reinforcing fibers and a waste plastic material incorporating reinforcing fibers, in order to



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the lower the cost of manufacturing the blow molded article, as taught by Van Ert et al.

Therefore, it would have been obvious to one having ordinary skill in the art at the time the applicant's invention was made to add a second layer of waste material by co-extrusion to the blow molded article of Gotz et al and Vercesi et al, in order to lower the cost of manufacturing the blow molded article, as taught by Van Ert et al.

#### ***ANSWERS TO APPLICANT'S ARGUMENTS***

6. Applicant's arguments regarding the 35 U.S.C. 102 rejections of claims 1, 3-6, and 9 as anticipated by Vercesi have been considered but are moot since the rejections have been withdrawn.

7. Applicant's argument regarding the 35 U.S.C. 103 rejection of claim 9 over Gotz et al in view of Vercesi et al have been considered but are moot since the rejection has been withdrawn.

8. Applicant's argument regarding the 35 U.S.C. 103 rejections of claims 1 and 3-8 over Gotz et al in view of Vercesi et al have been fully considered but they are not persuasive.



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In response to Applicant's argument that Vercesi et al teaches the diameter could be as great as 800 microns, although Vercesi et al does teach that, Vercesi further teaches that a preferred range of length is 0.7 to 3 mm (col.2, 1.16), which would make the preferred diameter at 300 microns. Furthermore, it would have been obvious to one having ordinary skill in the art through routine experimentation to select the optimum value for the diameter of the short aramid fibers depending on the intended end results of the article, absent the showing of unexpected result. Additionally, Vercesi teaches in example 1 that a preferred short aramid fiber used in the article is Kevlar, merge 1F361, which the applicant has conceded is identical to the aramid fibers contained in the preferred example masterbatch M of the instant specification.

In response to Applicant's argument that pages 14 and 15 of the instant specification provides unexpected results to render the aramid fibers of claim 1 of the instant invention obvious over the aramid fibers of Vercesi et al, first, Vercesi et al teach an example of the identical aramid fiber used in a more specific representation of the aramid fibers of claim 1 of the instant invention as conceded by the applicant. Second, evidence provided in the specification is comparing the effects of Canadian Standard Freeness on the properties of the article



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and not the diameter of the fibers. Vercesi et al explicitly teaches the same range for the Canadian Standard Freeness and therefore cannot be overcome by a showing that a value outside the range of Vercesi et al does not fulfill the requirements of the instant invention.

In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Gotz et al teach forming a solidified hollow blow molded article from polymers containing short aramid fibers, but fail to explicitly teach the Canadian Standard Freeness and diameter of the short aramid fibers. However, Vercesi provides explicit motivation to substitute the aramid fibers of Vercesi et al for standard or conventional aramid fibers, in order to provide the thermoplastic article with higher temperature capabilities and higher modulus performance (col.1, 1.47-62).



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In response to applicant's arguments against the references individually, one cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986). Specifically, although neither reference alone teaches all of the limitations of claim 1, taken as whole the combination of references teaches all that is claimed in claim 1 as shown above.

#### ***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Kawaguchi et al (USPN 4,753,760); Negi et al (USPN 4,645,695).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Christopher P Bruenjes whose telephone number is 571-272-1489. The examiner can normally be reached on Monday thru Friday from 8:00am-4:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harold Pyon can be reached on 571-272-1498. The fax phone number for the



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organization where this application or proceeding is assigned is  
703-872-9306.

Information regarding the status of an application may be  
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Christopher P Bruenjes  
Examiner  
Art Unit 1772

CPB *Ch Bruenjes*  
April 23, 2004

*Harold Pyon*  
HAROLD PYON  
SUPERVISORY PATENT EXAMINER  
*1772*

*4/26/04*